

**Amendments to the Claims:**

This listing of claims will replace all prior versions and listings of claims in the application.

**Listing of Claims:**

1. – 37. (Cancelled).

38. (Previously amended) A method of incidence risk reduction of polycystic ovary syndrome associated with androgen signaling, comprising administering to a human at risk for polycystic ovary syndrome an effective amount of lycopene to reduce androgen signaling.

39. (Previously presented) A method as in claim 38 wherein about 0.25 mg to about 50mg of lycopene are administered per day.

40. (Previously presented) A method as in claim 39 wherein about 1 mg to about 30 mg of lycopene are administered per day.

41. (Previously presented) A method as in claim 39 wherein, additionally, about 15 to about 600 mg of vitamin E are administered per day.

42. (Previously presented) A method as in claim 39 wherein, additionally, about 50 to about 1000 mg of vitamin C are administered per day.

43. (Previously presented) The method according to claim 38 wherein, additionally, an amount of lycopene is administered which results in a plasma concentration of 0.01 to 6  $\mu$ M